

Spotted Dog

DRAFT

Wildlife Management Area Habitat Plan 2017



Spotted Dog Work Group
Montana Fish, Wildlife & Parks

Spotted Dog Work Group

John Hollenback (Chair), Gold Creek: rancher, local/state leader in range management
Jim Flynn (Vice Chair 2013-2016), Anaconda: retired, business, local/state leader in governance (FWP, NRDP)
Jodi Pauley (Secretary), Deer Lodge: Powell County Agent, Montana State University Extension
Jason Swant, Helena: state government, Prickly Pear Sportsmen's Association (Chairman of the Board)
Bill Mosier, Deer Lodge: rancher, neighboring landowner, Deer Lodge Valley Conservation District (25 yrs)
Bill Pierce, Elliston: business, Powell County Planning Board, community leader, snowmobiler
Neil Horne, Helena: retired, P. P. Sportsmen's Assn (Pres.), Last Chance Backcountry Horsemen (Past Pres.)
Dan McQueary, Deer Lodge: rancher, neighboring landowner, Watershed Restoration Coalition (Board)
John Beck, Avon: rancher, Powell County Planning Board
Donna Young (Powell County Commission representative 2013-2016), Elliston
Doug Crachy (Powell County Commission representative 2016-present), Elliston
Brian Quigley, Avon: rancher, Rocky Mountain Stockgrowers Association
Liz Smith, Deer Lodge: Montana State Legislator (1993-1997), lifelong knowledge of Spotted Dog WMA
Louis Smith, Deer Lodge: rancher, neighboring landowner
Gayle Tomlinson, Deer Lodge: rancher, neighboring landowner, Deer Lodge Valley Conservation District
Fred Staedler (MT Dept. of Natural Resources and Conservation representative 2013-2015), Anaconda
Brian Robbins (MT Dept. of Natural Resources and Conservation representative 2016), Anaconda
Pat Hansen (contributing writer 2013-present): area journalist and photographer

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Julie Golla, Wildlife Biologist (2016-present), Upper Clark Fork, jgolla@mt.gov, 406-381-1268
Jason Lindstrom, Fisheries Biologist, Upper Clark Fork, jlindstrom@mt.gov, 406-529-8058
Kristi DuBois, Wildlife Biologist, Nongame, Missoula, kdubois@mt.gov
Brady Shortman, Wild. Manage. Area Maintenance Sup. (2016-present), bshortman@mt.gov 406-693-9083
David Dziak, Wildlife Management Areas Maintenance Supervisor (retired 2016)
Ray Vinkey, Wildlife Biologist (through 2015), Upper Clark Fork
Mike Thompson, Regional Wildlife Manager, Missoula, mthompson@mt.gov 406-542-5516
Randy Arnold, Regional Supervisor, Missoula, rarnold@mt.gov 406-542-5500
Kelvin Johnson, Wildlife Habitat Biologist, Glasgow, kelvinj@mt.gov 406-228-3727
Rick Northrup, Wildlife Habitat Bureau Chief, Helena, rnorthrup@mt.gov 406-444-5633



Cover image

The cover art is a "word cloud," which we created using *tagul.com*. The words were input from the minutes of the first 22 meetings of the Spotted Dog Work Group. The word cloud displays the most frequently used words in the largest fonts. For example, "Manage" was used 225 times in the meeting minutes—the most frequently.

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Executive Summary

This is a Habitat Plan (including Public Access)

This is the Habitat Plan for the Spotted Dog Wildlife Management Area (WMA). For the purposes of this Habitat Plan, public use of the WMA is considered part of the manageable environment to which soil, vegetation, fish and wildlife respond. So, the reader will find a section on Public Access, as well as sections addressing Native Species Diversity; Elk Winter Habitat; Fisheries; Aspen, Wetlands & Riparian; Native Bunchgrass; Antelope Bitterbrush; Coniferous Forest; Invasive Plants (Weeds) and Infrastructure.

Montana's Elk Management Plan Pertains

This Habitat Plan does not specifically address elk population management; i.e., elk numbers, objectives, harvest and hunting regulations. Elk population management is addressed in the Montana Final Elk Management Plan (January 2005), separate from this Habitat Plan. Spotted Dog WMA is located in elk Hunting District (HD) 215; elk management objectives and strategies for HD 215 can be found under the heading of Deer Lodge Elk Management Unit (EMU) in the Montana Final Elk Management Plan. In 2008, Montana Fish, Wildlife & Parks (FWP) revisited the elk population objective for HD 215 with a working group of interested citizens, resulting in a proposal to up the objective from 1,000 to 1,400. The Montana Fish, Wildlife & Parks Commission adopted the higher objective in 2008.

In 2008, the elk count for HD 215 was 1,365 and at its objective. Two years later, FWP acquired Spotted Dog WMA. In 2013, the Spotted Dog Work Group formed to work with FWP on issues related to the WMA. From 2009 to 2017 the elk count for HD 215 rose to 2,850, double its objective.

The Work Group and FWP understand that no matter its management, the WMA cannot feasibly attract enough elk from neighboring ranches to alleviate elk damage at these high elk numbers. Therefore, habitat management—the topic of this Habitat Plan—cannot substitute for elk harvest and population management, which is already directed by the Montana Final Elk Management Plan and must be addressed accordingly. These facts do not preclude livestock grazing as a tool for enhancing wildlife habitat on portions of the WMA and on private lands in a cooperative habitat management agreement.

Roles of FWP, the Work Group & the Public

FWP is responsible for managing Spotted Dog WMA in keeping with the goals for acquiring and maintaining it with dedicated public funds. Therefore, all citizens have a voice in WMA management.

FWP and the Spotted Dog Work Group collaborated to prepare a draft Habitat Plan for broader public review. The Work Group is comprised of 18 citizens, mostly from the area local to the WMA, representing landowners, sportspersons, government, education and other interests. The Work Group formed in 2013 and its meetings (25 to date) are open to the public.

FWP will advertise the plan's availability for public review and comment. FWP will finalize this Habitat Plan after incorporating public input in late 2017 or early 2018.

Formal public involvement as directed under the Montana Environmental Policy Act (MEPA) will be solicited if and when specific habitat projects outlined in this Habitat Plan are proposed in the future. Such projects would include livestock grazing on the WMA, a revised travel management plan, and land transactions, to name a few.

Purpose & Goals (page 8)

FWP acquired and established the Spotted Dog WMA on September 2, 2010. The goals of the purchase, as listed in FWP's grant application to the Natural Resource Damage Program (NRDP), were to protect priority fish and wildlife resources; enhance critical winter habitat for elk and mule deer, maintain migratory patterns to and from the National Forest for a regionally significant elk herd; provide lasting public access to previously inaccessible lands; maintain landscape connectivity between the Blackfoot and Clark Fork watersheds; and to replace lost and injured natural resources that were the subject of *Montana v. ARCO*.

The Work Group developed and adopted the following Guiding Principles for preparing the draft Habitat Plan:

1. The primary purpose of the Spotted Dog WMA is to benefit wildlife and fish habitats, and natural resources on behalf of the general public.

2. Actions will be sustainable for future generations.
3. Provide access for a wide variety of uses consistent with the management plan.
4. Be a good neighbor with the landowners and the residents of Powell County.

Area Description (pages 9-26)

Spotted Dog WMA covers 37,877 acres in south Powell County, with 27,616 acres deeded to FWP and 10,261 acres leased from the Montana Department of Natural Resources and Conservation (DNRC). Herein, we divided the WMA into five Management Units (MU) for planning purposes. Each MU generally corresponds with one principal drainage system and access route. The MUs also generally reflect broad distinctions of vegetation and wildlife.

The MUs present differing challenges of management. The O'Neill Creek MU (MU-1) contains the primary public access point to the WMA from the Deer Lodge side of the property, via Freezeout Lane; includes the Rocky Ridge communications site and the BPA 500-KV powerline; and is bordered by a residential area along Beck Hill Road. MU-1 and the Freezeout-Jake MU (MU-2) border ranches along the Old Stagecoach county road, which has been closed to public access in recent decades. Public access to MU-2 from the Jake Creek Road is also currently closed where the road crosses private land before reaching the WMA. The Spotted Dog MU (MU-3) also borders private ranches along the track of the Old Stagecoach Road, and includes the old Pauly Place buildings and corrals, as well as Spotted Dog Reservoir. Public access is available to the Trout Creek MU (MU-4) from Avon, continuing into MU-3. A groomed snowmobile route runs across MU-4 and the Forested Checkerboard MU (MU-5) from Avon to Elliston. MU-5 and part of MU-4 are unfenced against an active livestock allotment on the Helena National Forest. Whereas the other MUs will be managed with an eye toward the larger rangeland and riparian landscape, MU-5 will be managed with an awareness of its contribution as part of the larger coniferous forest.

Land Use History (page 16)

The property now known as Spotted Dog WMA has a long history of ranching, involving cattle and in earlier years, sheep. Under the purchase agreement (dated July 28, 2010) by which FWP acquired the WMA property from the Rock Creek Cattle Company (RCCC), it was agreed that RCCC would retain limited grazing rights on the WMA through December 31, 2012. At the request of RCCC, the Montana Fish, Wildlife & Parks Commission subsequently extended that grazing agreement through 2013. From 2014 forward, FWP has provided rest from livestock grazing as outlined in its Management Plan and the Livestock Grazing Amendments to the Plan contained in the Decision Notice for the purchase of Spotted Dog WMA (August 2010). Livestock trespass continues across the WMA's unfenced boundary with the Helena National Forest.

Ecological Inventory & Health (pages 27-28)

Hansen et al. (2015) characterized the soil, water and vegetation of FWP deeded lands across 90% of Spotted Dog WMA. Upland grasslands are in the best condition, and the best of the best are concentrated in the northernmost sections of MU-4. Conversely the problem area for upland grassland, shrubland and wetland environments is in western MU-1.

Despite the unhealthy and non-functional condition of some uplands in MU-1, O'Neill Creek ranked highest in ecological condition among streams, with an overall health rating of 79%. The MU-2 streams came second in order of ecological condition, with Fred Burr Creek at 74%, Freezeout Creek at 65% and Jake Creek at 61%. MU-3 followed with Spotted Dog Creek at 62%. Trout Creek, in MU-4, ranked last in stream health (54%).

Monitoring (pages 29-30)

The ecological inventory and health assessment (EIHA) by Hansen et al. (2015) offers a repeatable framework for future ecological monitoring. FWP will plan to repeat the EIHA by 2025 to monitor the condition and trend of vegetation under the influence of this Habitat Plan. Inherent in the repeated EIHA is a check for changes in noxious weed distribution. Photo points will be established to monitor representative habitats that are featured in this plan at more frequent intervals between replicates of the EIHA.

Maintenance activities on the WMA will be compiled in an annual report, including weed control, fence repair and other activities. Fish and wildlife surveys will be scheduled as needed in accordance with regional information priorities.

Prescribed management treatments, such as livestock grazing, fence construction and forest management, will be monitored during the periods while those treatments are occurring on the land to assure compliance with prescriptions and to identify adjustments that may be needed.

Invasive Plants (Weeds) (pages 31-32)

MU-1 had the highest proportion of sampling plots (51%) with >10% coverage of invasive species, followed by MU-2 (31%), MU-4 (26%) and MU-3 (21%) (Hansen et al. 2015). Twenty-two invasive plant species were identified on the WMA, with cheatgrass covering the most acres (632) and spotted knapweed ranking second (437 acres). Weed management objectives and strategies are addressed where they pertain under the resource headings/priorities (e.g., Native Species Diversity, Elk Winter Habitat, etc.) in this Habitat Plan.

- ◆ A weed management strategy common to every resource priority is to make a habit of documenting and treating new weed occurrences while driving roads, fixing fences and in the course of other duties on the WMA.
- ◆ Comply with FWP's Statewide Weed Plan and the Powell County Weed Plan.
- ◆ Work with Powell County to develop a WMA weed map.

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Part of a Larger Whole (pages 33-34)

Cooperation is essential to achieve compatible management of fish and wildlife habitat across the larger landscape, of which the WMA is but a part. It will be a priority to budget for the time commitment required to work thoughtfully and effectively with our neighbors. For that purpose, FWP employs a decentralized operational structure. Locally-based professionals are vested with the delegated authority to speak and act on behalf of FWP, and are charged with becoming part of their local communities.

Native Species Diversity (pages 35-36)

Direction: Enhance the food web, focusing on the base of the energy pyramid: soil health, litter, native forbs, pollinators and the like.

Base Budget Items and Work Priorities:

- ◆ Prevent new weed establishments with early detection and eradication.
- ◆ Where herbicide is needed to control weeds, spot-spray whenever possible rather than broadcast spray, and use the most selective herbicide for the job.
- ◆ Watch cheatgrass distribution and avoid creating niches for cheatgrass expansion.
- ◆ Maintain boundary fences to minimize livestock trespass.
- ◆ Consider prescribed cattle grazing to enhance structural diversity in grasslands.
- ◆ When grazing, limit grazing impacts during the nesting season and/or rotate treatments.
- ◆ Allow litter to develop and decay in grassland communities where litter should accumulate.
- ◆ Prevent off road vehicular travel.
- ◆ Recruit and retain large snags in forests.

Priorities for Special Projects when Feasible:

- ◆ Consider forest restoration treatments to foster the recruitment of naturally occurring stand characteristics in historically harvested stands.
- ◆ Develop forest management treatments to manage the risk of stand replacement events.
- ◆ Remove conifer encroachment in grasslands, aspen, and wetlands as appropriate.

Species of Concern (pages 37-38)

Direction: Reverse population declines for Species of Concern.

Base Budget Items and Work Priorities:

- ◆ Maintain native species diversity in healthy habitats, and work to restore species diversity in degraded habitats. Native species diversity includes managing native plant communities to support species-rich native animal communities including songbirds, raptors, reptiles, amphibians, small mammals, and insects.
- ◆ Riparian, wetland, and aspen communities support the highest wildlife species diversity, so those communities need to be managed with special care to ensure their protection and enhancement on the WMA.
- ◆ Maintain and/or restore populations of Species of Concern that are naturally found in WMA habitats.
- ◆ Explore ways for the public to view and learn about wildlife, while minimizing impacts to wildlife and plants.

Elk Winter Habitat (pages 39-40)

Direction: Prioritize Elk Winter Habitat in MUs 1 & 2.

Base Budget Items and Work Priorities:

- ◆ Maintain fences to minimize livestock trespass and reserve forage for wintering elk.
- ◆ Identify and eradicate first occurrences of new weed species or weeds in new places.
- ◆ Watch cheatgrass distribution and avoid creating niches for cheatgrass expansion.
- ◆ Coordinate closely with communications towers maintenance and powerline right-of-way maintenance.
- ◆ Retain forest stringers and thickets.
- ◆ Close WMA to the public from December 2-May 15.
- ◆ Control hunting access if hunting is needed during winter to achieve elk harvest goals, while minimizing disturbance to elk on their winter range.

Priorities for Special Projects when Feasible:

- ◆ Forest management will employ a light touch as needed in MU-1 and MU-2, if at all, to extend the function of small-acreage stands into the future and to manage risk.

Aspen, Wetlands & Riparian (pages 41-42)

Direction: Recover or restore aspen, wetland and riparian systems

Base Budget Items and Work Priorities:

- Protect aspen, wetland and riparian areas from noxious weeds as a focus of overall weed management efforts.
- Protect these areas from unauthorized livestock.
- Avoid and correct road, culvert and sediment impacts.
- Prevent damage from off road vehicles.
- Manage conifer encroachment in aspen.
- Protect beaver on Spotted Dog WMA.
- Recruit and protect snags, especially deciduous spp.

Priorities for Special Projects when Feasible:

- Plant native riparian vegetation (i.e., willows).
- Prescribe more extensive forest management and conifer treatment to rejuvenate aspen.
- Consider redistributing beaver at such time as the forage base would support beaver.
- In the absence of beaver, consider mimicking beaver activity with instream structures.

Fisheries (pages 43-44)

Direction: Enhance habitat for native westslope cutthroat trout.

Base Budget Items and Work Priorities:

- Protect streamsides from noxious weeds to minimize sediment delivery to streams.
- Protect streams from livestock impacts.
- Avoid and correct road, culvert and sediment impacts.
- Prevent damage from off road vehicles.

Priorities for Special Projects when Feasible:

- Utilize active stream restoration to address habitat degradation and channelization.
- Plant woody riparian vegetation where absent due to past land use practices.
- Remove or resize stream crossings (e.g., culverts).

Native Bunchgrass (pages 45-46)

Direction: Maintain climax rough fescue stands where they currently exist, and manage for soil stability and a healthy mix

of native increasers and decreasers in bunchgrass vegetation types overall.

Base Budget Items and Work Priorities:

- ◆ Maintain fences to minimize livestock trespass.
- ◆ Identify and eradicate first occurrences of new weed species or weeds in new places.
- ◆ Watch cheatgrass distribution and avoid creating niches for cheatgrass expansion.
- ◆ Consider prescribed cattle grazing to add vegetation community structure in grasslands other than designated rough fescue reference sites., and as a tool for achieving grazing improvements on privately owned bunchgrass communities as well.
- ◆ Confine motorized traffic to open roads.

Priorities for Special Projects when Feasible:

- Restore native communities on sites dominated by cheatgrass on a prioritized basis, pending the development of sound methodologies for cheatgrass control.
- Develop interpretive signage to increase the public's appreciation for native grasslands and their management.
- Remove conifer encroachment.

Antelope Bitterbrush (pages 47-48)

Direction: Reserve antelope bitterbrush stands for their unique wildlife habitat qualities.

Base Budget Items and Work Priorities:

- ◆ Maintain fences to minimize livestock trespass.
- ◆ Identify and eradicate new weeds or weeds in new places.
- ◆ Watch cheatgrass distribution and avoid creating niches for cheatgrass expansion.
- ◆ Use biological controls or spot spray with the most selective herbicides to avoid damage to bitterbrush while addressing noxious weeds in MU-1 and MU-2.
- ◆ Keep elk numbers in balance.
- ◆ In MU-1 and MU-2 discourage public camping and prohibit fires.
- ◆ Limit motorized access to few well worn roads.

Priorities for Special Projects when Feasible:

- ◆ Monitor bitterbrush condition and trend over time.
- ◆ Monitor wildlife use in bitterbrush.
- ◆ Develop interpretive signage to help the public appreciate bitterbrush and its value.
- ◆ There may be a need at some point to intensively treat cheatgrass in bitterbrush stands, pending development of effective cheatgrass control methods.

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Coniferous Forest (pages 49-50)

Direction: Coniferous forest makes up about 15% of the lands deeded to FWP within Spotted Dog WMA. Most of it lies within MU-5, intermingled in the Helena National Forest, and is largely cutover, having been harvested shortly before the property was acquired by FWP. In the near term, forest management on Spotted Dog WMA will be limited, as follows:

Base Budget Items and Work Priorities:

- ◆ Eradicate new weed species or weeds in new places.
- ◆ Protect snags and snag recruits.
- ◆ Prohibit wood cutting for offsite use.

Priorities for Special Projects when Feasible:

- ◆ Inventory the forest.
- ◆ Develop a forest management plan that focuses on regeneration of a healthy forest structure.
- ◆ Treat forest disease issues as they arise and take any preventative actions identified in the forest plan.

Public Access (pages 51-54)

Direction: Offer access to appreciate fish and wildlife, and to effectively balance wildlife with their habitat.

Base Budget Items and Work Priorities:

- ◆ Maintain open roads to WMA statewide standards.
- ◆ Enforce road closures and other user regulations to lessen user conflicts and resource damage.
- ◆ Manage hunter access to provide the publicly desired hunting experience and manage wildlife populations.
- ◆ Allow over-the-snow access on USFS Road 314.
- ◆ Maintain the winter closure to limit human disturbance of wintering elk and deer, with any exceptions as may be required to manage wildlife populations.
- ◆ Maintain effective signage, focusing on identifying property boundaries to prevent trespass on neighboring lands.
- ◆ Enact fire season restrictions with interagency collaboration.
- ◆ Develop and maintain updated travel maps, regulations and information online and on paper for distribution.

Priorities for Special Projects when Feasible:

- ◆ Develop portal/entrance signage.
- ◆ Develop a trail system, pending definition and funding.
- ◆ Identify designated camping areas if needed in the future, but avoid installing campground developments.

Interpretive Resources (pages 55-56)

Direction: Develop interpretive signage and other informational materials to enhance the public's appreciation of their WMA.

Base Budget Items and Work Priorities:

- ◆ Design and install a large-panel highway sign, to be placed along Highway 12 or other appropriate highway location, to inform the public about Spotted Dog WMA and identify its funding sources and purposes.
- ◆ Work with Audubon and local birders to develop a bird list and birding brochure for Spotted Dog WMA.
- ◆ Work with local historians to uncover and interpret the history of the Spotted Dog area.

Priorities for Special Projects when Feasible:

- ◆ Develop interpretive signage, recognizing that it is vulnerable to vandalism in remote locations.
- ◆ Develop a trail system involving low-profile interpretive signage and/or brochures. Consider a diversity of travel types, including motorized travel routes on the established open road system, as well as trails for nonmotorized use.

Infrastructure (pages 57-58)

Direction: Establish mutually beneficial property boundaries, facilities and improvements.

Base Budget Items and Work Priorities:

- ◆ Communicate routinely and effectively with Powell County, DNRC, USFS and neighbors.
- ◆ Cooperate with all affected parties on the Old Stagecoach Road issue.
- ◆ Work with DNRC on leases of DNRC lands to FWP.
- ◆ Work with private neighbors on fences, weeds, property exchanges, and trailing livestock across the WMA.
- ◆ Work with USFS on management of intermingled parcels.
- ◆ Prepare an annual report of maintenance activities.

Priorities for Special Projects when Feasible:

- ◆ Construct new boundary fences where still needed.
- ◆ Develop portal/entrance signage.
- ◆ Identify designated camping areas if needed in the future, but avoid installing campground developments.
- ◆ Work on proposing land transactions and public involvement to block up FWP ownership within the WMA.